Johnson City Field Office
TENNESSEE DEPARTMENT OF ENVIRONMENT AND CONSERVATION
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November 3, 2009

Certified Mail # 7009 1680 0000 9873 1364
Return Receipt Requested

Mr. Fred Hicks, General Manager
Bloomingdale Utility District
3212 Bloomingdale Pike
Kingsport, TN 37660

Re: Notice of Violation
Compliance Evaluation Inspection (CEI)
Bloomingdale Utility District Water Treatment Plant
NPDES Permit # TN0062235

Dear Mr. Hicks:

On October 21, 2009, I conducted a Compliance Evaluation Inspection (CEI) of the treatment system for wastewater generated during operation of the Bloomingdale Utility District Water Treatment Plant located at 571 Nottingham Road in Kingsport. The purpose of the inspection was to verify compliance with the requirements of the General NPDES Permit for Discharges of Filter Backwash and Sediment Basin Washout from Water Treatment Plants. I met with Chief Plant Operator James M. Cradic, who provided assistance during the inspection.

The following information and observations were obtained during the inspection or from file review.

Operation and Maintenance
The turbidity removal plant operates with four high-rate gravity sand filters that are backwashed three times per week. Approximately 10,000 gallons of treated water is used to backwash each filter. The filter backwash water is pumped into an open air concrete settling basin, which is designed to hold approximately 360,000 gallons. Excess plant use water is also pumped to this

settling basin where the waste water is allowed to settle at least 24 hours before discharging into Reedy Creek at mile 10.6. The sedimentation basin is washed out twice a year or as needed using approximately 15,000 gallons each time. The water from the sedimentation basin can either be discharged by gravity or via a submerged pump which allows faster discharge if deemed necessary by the plant operators. The overall maintenance and operation of the plant appear to be in good standing.

A sludge pit is located on-site which is used for the disposal of the washwater from the sedimentation basin as well as the three clarifiers, which are cleaned four times a year. The sludge pit has a capacity of 140,000 gallons. The sludge is dipped from the pit and allowed to dry in a sludge drying area, which is also located on-site. The dried sludge is then land applied.

Records and Reports

As of the date of the inspection, the current permit had expired (expired on September 27, 2009). For a facility presently covered by the general permit, a Notice of Intent (NOI) shall be submitted within 30 days of the effective date of the reissued general permit. The permit on file at the plant was expired on June 30, 2004. A copy of the entire current permit should always be maintained on file at the plant to reference permit requirements. A copy of the most recent permit was copied during the inspection. The permit should be reviewed by plant personnel in order to become familiar with all the requirements.

Discharge Monitoring Reports (DMR), submitted to this office spanning the previous three years were reviewed during site inspection. The review indicated that there were no violations of the permit parameters. Documentation for sampling place, date and time were also reviewed indicating that reports are being adequately logged and filed.

Sampling & Laboratory Analysis

Grab samples are collected as required by permit. The samples are being taken at the surface of the sedimentation basin, where the basin drain is located at the bottom of the basin. The permit requires that samples taken be representative of the volume and nature of discharges of filter backwash and sedimentation basin washwater. The samples and measurements must be taken after treatment of the filter backwash and after sedimentation basin washwater and prior to mixing with the receiving stream. Grab sample collection location appeared to be the only problem with the plant's self-monitoring procedures.

Total suspended solids, settleable solids, and Aluminum (Total) analyses are performed by GPL Laboratories located in Johnson City. The remaining analyses, pH and Total Residual Chlorine, are performed on-site by plant personnel. pH is determined using the Hach Sension meter, calibrated daily with 4.0 and 7.0 standards. Total Residual Chlorine is determined using the Hach DR/2000 spectrophotometer. All on-site laboratory equipment is calibrated yearly by Labtronics, Inc. Labtronics 'Certificate of Calibration' was made available and filed along with all on-site equipment calibrations.

Outfall Point
The outfall to Reedy Creek was visited during the site inspection. The outfall has been posted with a sign that satisfies the permit requirement. There was no visible adverse effect on the receiving stream observed at the time of the site inspection.

Failure to renew or reapply for the *TN General NPDES Permit for Discharges of Filter Backwash and Sedimentation Basin Washout From Water Treatment Plants* and failure to take representative samples of wastewater discharged to waters of the state are violations of the NPDES Permit and subsequently of the *Tennessee Water Quality Control Act* (69-3-101 et. seq.). This letter will serve as a formal Notice of Violation and by copy will inform the Division's Enforcement and Compliance Section of the violations and the request for corrective action. In order to come into compliance with the *Act*, you must take the following actions:

1. Submit a completed NOI for Water Treatment Plant Discharge Permit (included with this correspondence) to:

   WTP NOI
   Division of Water Pollution Control
   6th Floor L&C Annex, 401 Church Street
   Nashville, TN 37243-1534

2. Samples must be taken below the sedimentation basin and prior to mixing with the receiving stream.

A written response is required within 30 days of receipt of this letter stating what action has been, or will be, taken to correct these violations and deficiencies.

I would like to thank Mr. Cradic for his assistance and cooperation during the inspection. If you should have any questions, or if I can be of assistance, please contact me at brown.patton@tn.gov or at (423) 854-5458.

Sincerely,

Brown Patton

Brown Patton
Division of Water Pollution Control
Johnson City Environmental Field Office

Cc: Enforcement and Compliance, DWPC, 6th Floor L&C Annex, 401 Church St., Nashville, TN 37243